Amendments to the Claims:

A clean version of the entire set of pending claims (including amendments to the claims, if any) is submitted herewith per 37 CFR 1.121(c) (3). This listing of claims will replace all prior versions, and listings, of claims in the application.

1. (Currently Amended) An optical testing unit for measuring a bit error rate of an optical device under test (DUT) over an operating range of the DUT comprising:

an optical transmitter, which transmits an optical test signal that is transmitted to the DUT;

an optical receiver, which receives an input signal from the DUT;

a graphical user interface, which provides an interface with a user;

a memory module, said memory module comprising a test module and a sensitivity module, said sensitivity module comprising information utilized by said controller during a sensitivity test; and

a controller, selectively coupled to said transmitter, said receiver and said graphical user interface, wherein said controller provides a central control of said transmitter, said receiver and said graphical user interface.

2. (Original) An optical testing unit as recited in claim 1, wherein said memory module further comprises a calibration module, said calibration module comprising information utilized by said controller during a calibration procedure.

3. (Cancelled).

4. (Original) An optical testing unit as recited in claim 1, wherein said memory module further comprises a standard success criteria module, said standard success criteria module comprising information utilized by said controller to compare test results to an industry standard.

5. (Original) An optical testing unit as recited in claim 1, wherein the unit is disposed in a housing.

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6. (Original) An optical test unit as recited in claim 1, further comprising an optical power monitor, which is controlled by said control unit.

7. (Original) An optical testing unit as recited in claim 6, further comprising an optical attenuator, which receives said optical test signal and selectively attenuates said test signal prior to providing an attenuated input signal to the DUT .

8. (Original) An optical test unit as recited in claim 7, wherein said control unit actively adjusts at least one of: an output power level of said transmitter; and an attenuation level of said attenuator to transmit said test signal at a desired power level as measured by said optical power monitor.

9. (Original) An optical test unit as recited in claim 8, wherein said control unit iteratively performs said adjustments.

10. (Currently Amended) A method of measuring a bit error rate of an optical component, the method comprising:
    providing an optical testing unit disposed in a housing;
    providing a test optical signal as an output signal from said optical testing unit to a device under test (DUT);
    receiving an input signal from said DUT at said optical testing unit;
    measuring a bit error rate from said input signal; and
    providing a control unit within said housing which controls various components in said optical test unit, wherein the control unit further comprises a memory module, said memory module further comprises a test module; said test module comprising information utilized by said controller during said method.

11. (Original) A method as recited in claim 10, wherein said test optical signal is from an optical transmitter within said optical testing unit.

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12. (Original) A method as recited in claim 10, wherein said input signal is received at an optical receiver within said optical testing unit.

13.-14. (Cancelled).

15. (Currently Amended) A method as recited in claim [[14]]10, wherein said memory module further comprises a calibration module.

16. (Cancelled).

17. (Currently Amended) A method as recited in claim [[14]]10, wherein said memory module further comprises a standard success criteria module.

18. (Original) A method as recited in claim 10, wherein said optical testing unit further comprises a graphical user interface (GUI).

19. (Original) A method as recited in claim 18, wherein said GUI is adapted to receive manual inputs to commence and terminate the measuring.

20. (Original) A method as recited in claim 15, wherein said bit error rate measuring is affected after an automated calibration procedure is completed.

21.-24. (Cancelled).